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**METHODS AND COMPOSITIONS FOR
DETECTION OF SPECIFIC NUCLEOTIDE
SEQUENCES**

Abstract of the Invention

10 Methods and compositions are provided for the
detection of specific nucleic acid sequences purified from
cellular or tissue sources. More particularly, the present
invention includes methods and compositions for the
detection of nucleic acid sequences using a protection
molecule that forms a protected nucleic acid sequence
15 (PNAS) such as a triplex or duplex nucleic acid structure
that includes the target nucleic acid sequence. An assay
using the methods of the present invention may include one,
two or three levels of specificity to minimize false positive
signals. An assay using the methods or compositions of the
20 present invention can be performed on large amounts of
purified DNA in a single test, with high levels of
sensitivity, thus eliminating the need for DNA amplification
procedures.